

DEPARTMENT OF TRANSPORTATION

DIVISION OF ENGINEERING SERVICES

Office of Structural Materials

Quality Assurance and Source Inspection



Bay Area Branch
690 Walnut Ave.St. 150
Vallejo, CA 94592-1133
(707) 649-5453
(707) 649-5493

Contract #: 04-0120F4Cty: SF/ALA Rte: 80 PM: 13.2/13.9File #: 99.28**WELDING INSPECTION REPORT****Resident Engineer:**Siegenthaler, Peter**Address:** 333 Burma Road**City:** Oakland, CA 94607**Report No:** WIR-025510**Date Inspected:** 28-Jul-2011**Project Name:** SAS Superstructure**OSM Arrival Time:** 700**Prime Contractor:** American Bridge/Fluor Enterprises, a JV**OSM Departure Time:** 1900**Contractor:** Zhenhua Port Machinery Company, Ltd (ZPMC), Changxing Island **Location:** Shanghai**CWI Name:****CWI Present:****Yes No****Inspected CWI report:** **Yes No N/A****Rod Oven in Use:** **Yes No N/A****Electrode to specification:** **Yes No N/A****Weld Procedures Followed:** **Yes No N/A****Qualified Welders:** **Yes No N/A****Verified Joint Fit-up:** **Yes No N/A****Approved Drawings:** **Yes No N/A****Approved WPS:** **Yes No N/A****Delayed / Cancelled:** **Yes No N/A****Bridge No:** 34-0006**Component:** OBG**Summary of Items Observed:**

On this date Caltrans OSM Quality Assurance (QA) Inspector R. Hernandez was present during the time noted above and conducted observations relative to the work being performed.

The QA Inspector randomly observed the following work in progress:

This QA Inspector witnessed the in-process high strength bolt installation on bolts connecting the following connections:

- Horizontal connection plates connecting longitudinal diaphragm to deck panels at W3 and W4 lines between PP120 and PP124.5. Tensioning is complete.
- Bottom plate and side Plate PP120 to PP124.5 stiffeners installed but not tightened at this time.
- Horizontal connection plates between Longitudinal Diaphragms and Floor Beams on W3 and W4 lines from bottom plate elevation to Deck plate elevation between PP120 and PP124. Pre-tensioning and installation in progress.

Bolting on the above named areas is in progress and still requires final tension verification prior to final acceptance. The QA Inspector verified installation of the high strength bolts on a random basis and the results appeared to be in general compliance. No notifications have been issued for these installations.

Boat Lift 13W

WELDING INSPECTION REPORT

(Continued Page 2 of 3)

This QA Inspector witnessed the final bolt tension verification on bolts connecting the U-rib stiffeners at deck panels and Longitudinal diaphragms at deck panels at the locations listed below, The QA Inspector verified the bolt tension on a random basis and the results appeared to be in general compliance. The Inspection was performed against Notification No. 00715 dated July 28, 2011.

- PP120 to PP120.5, U-rib stiffeners at deck panel to deck panel (cross beam side).
- PP117 to PP120, Longitudinal diaphragm to deck panels at W3 and W4 lines.
- PP121 to PP121.5, U-rib stiffeners at deck panel to deck panel (counter weight side).
- PP123 to PP123.5, U-rib stiffeners at deck panel to deck panel (counter weight side).
- PP124 to PP124.5, U-rib stiffeners at deck panel to deck panel (counter weight side).
- PP120 TO PP120.5 U-rib stiffeners at deck panel to deck panel (cross beam side).
- PP122 to PP122.5, U-rib stiffeners at deck panel to deck panel (counter weight side).

The bolt sizes used were M22 x 65 RC Lot # DHGM220131 and the final torque value established was 380 N-m.
The bolt sizes used were M22 x 70 RC Lot # DHGM220137 and the final torque value established was 400 N-m.
The bolt sizes used were M22 x 80 RC Lot # DHGM220140 and the final torque value established was 380 N-m.
The bolt sizes used were M22 x 85 RC Lot # DHGM220121 and the final torque value established was 393 N-m.
The bolt sizes used were M24 x 75 RC Lot # DHGM220115 and the final torque value established was 460 N-m.
The bolt sizes used were M24 x 100 RC Lot # DHGM220125 and the final torque value established was 440 N-m.
The bolt sizes used were M24 x 90 RC Lot # DHGM220123 and the final torque value established was 467 N-m.
The bolt sizes used were M24 x 120 RC Lot # DHGM220127 and the final torque value established was 427 N-m.
The bolt sizes used were M22 x 65 RC Lot # DHGM220129 and the final torque value established was 360 N-m.

The Manual Torque wrench used was Serial No. XO2-777.

Boat Lift 14W

This QA Inspector witnessed the final bolt tension verification on bolts connecting the Catwalks at FL-3 at the locations listed below, The QA Inspector verified the bolt tension on a random basis and the results appeared to be in general compliance. The Inspection was performed against Notification No. 00717 dated July 28, 2011.

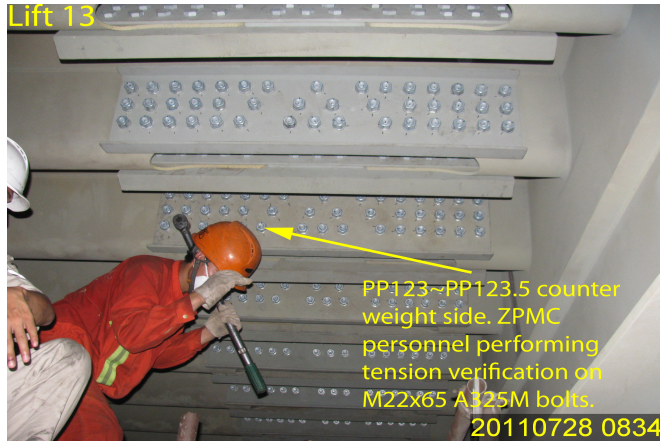
- 14W catwalks @ FL-3 PP124.5 to PP128.7

The bolt sizes used were M16 x 40 RC Lot # DHGM160045 and the final torque value established was 180 N-m.
The bolt sizes used were M16 x 50 RC Lot # DHGM160004 and the final torque value established was 180 N-m.
The bolt sizes used were M16 x 55 RC Lot # DHGM160012 and the final torque value established was 200 N-m.
The Manual Torque wrench used was Serial No. XO2-777.

Unless otherwise noted above all items observed on this day appeared to be in general compliance with the applicable contract documents

WELDING INSPECTION REPORT

(Continued Page 3 of 3)



Summary of Conversations:

Pertinent conversations are included in the body of the report.

Comments

This report is for the purpose of determining conformance with the contract documents and is not for the purpose of making repair or fit for purpose recommendations. Should you require recommendations concerning repairs or remedial efforts please contact Eric Tsang 1500-0042-02372, who represents the Office of Structural Materials for your project.

Inspected By:	Hernandez,Rene	Quality Assurance Inspector
Reviewed By:	Hall,Steven	QA Reviewer
